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## SWMI Framework Comments

Water Management Act defines safe yield as “the maximum dependable withdrawals that can be made continuously from a water source including ground or surface water during a period of years in which the probable driest period or period of greatest water deficiency is likely to occur; provided, however, that such dependability is relative and is a function of storage and drought probability.” This could be interpreted to allow gradual degradation of and depletion of water resources over a period of time as long as the withdrawals are dependable through the anticipated period. The Framework lacks discussion of the “period” length that is necessary to give sufficient expansion/clarification of the definition of safe yield to ensure long term maintenance of adequate water resources to sustain a strong economy or reasonable population in our Commonwealth.

Use of good science as a basis for determination of Safe Yield is an excellent idea. The agencies and especially USGS have done a stellar job given their underlying resources (funding constraints). However the science necessarily relies on models. Models are inherently dependent on the quality of their input. The input is limited by current data and knowledge. No one has a good crystal ball. We might get it wrong.

.A requirement for reassessment and a mechanism for modification of the Safe Yield levels or the Framework itself, using updated data and possibly more advanced modeling should be *built into* the Framework. The models use historic weather and flow data. The number of USGS stream gauges and groundwater monitoring wells has been curtailed. There is reason to suspect that the climate is changing which makes projections problematic. Reassessments should be on a rolling schedule. That they be built into this initial Framework is particularly important because of the usual glacial rate of regulatory revision.

The Framework does not clearly address modification of existing WMA withdrawal permits in already stressed basins. “1-9. For basins where current allocations (but not current use) are greater than SY, MassDEP will employ a permitting strategy that will ensure, through conditions, that use does not exceed SY through the life of the permit.” Uh Huh. Clarification directly in the Framework of how this is to be achieved or citation of relevant regulations would be helpful.

The Framework seems to focus on public water supply rather than other withdrawal permittees and it states, "safe yield is not a water allocation scheme. It is highly unlikely that this amount would be fully allocated in a basin." Some indication of a priority or system for allocation should be included. In addition the Framework fails to directly address the consequences for downstream conditions from withdrawals in small tributary headwater basins. Again, clarification in the Framework or citation of relevant regulations would be helpful.

Note in 4 -f.

"In determining if a mitigation or offsets action is feasible, the following should be taken into consideration,

- Cost
- Level of improvement
- The purview that is under the authority of the permittee
- Adaptive Management."

That's too limited scope for consideration of feasibility. Comparison of cost mitigation or offsets to cost to restore damaged resources or the monetary/economic value of threatened resources would be more instructive for permitting decisions.

The Framework allows wide permitting discretion and does not define a "permissible permit." This foggy aspect will guarantee consumption of excessive agency staff time during permitting and will cripple enforcement.

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